Dan Skonec

Acting Agency Secretary

California Regional Water Quality Control Board

San Francisco Bay Region

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Date: MAY 1 8 2006

File No. 2199.9457 (BJT) Site No. 02-01-C0884

Certified Mail No. 70033110000265559131

Mr. Ron Kiaaina
California Department of Transportation
111 Grand Avenue
P.O. Box 23660
Oakland, CA 94623

Subject: Waste Discharge Requirements and Water Quality Certification for the Pigeon Pass Route 84 Realignment Project

Dear Mr. Kiaaina:

The San Francisco Bay Regional Water Quality Control Board adopted Order No. R2-2006-0033, Waste Discharge Requirements and Water Quality Certification for the Pigeon Pass Route 84 Realignment Project, on May 10, 2006. The adopted Order is attached.

If you have any questions, comments, or concerns, please contact Brendan Thompson of my staff at (510) 622-2506, or via e-mail to BThompson@waterboards.ca.gov.

Sincerely,

Bruce H. Wolfe

Executive Officer

cc: Mr. Oscar Balaguer, SWRCB-DWQ

Mr. Hal Durio, Regulatory Branch, USACE

Ms. Marcia Grefsrud, CDFG, Yountville

Hardeep Takhar, Caltrans

CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD SAN FRANCISCO BAY REGION

ORDER No. R2-2006-0033

WASTE DISCHARGE REQUIREMENTS AND WATER QUALITY CERTIFICATION FOR:

CALIFORNIA DEPARTMENT OF TRANSPORTATION

PIGEON PASS STATE ROUTE 84 REALIGNMENT PROJECT, ALAMEDA COUNTY

The California Regional Water Quality Control Board, San Francisco Bay Region, hereinafter Water Board, finds that:

- 1. The California Department of Transportation (hereinafter the Department) proposes to realign a 2.3-mile portion of State Route 84 (hereinafter SR 84), from Post Mile 20.7 to Post Mile 23.0, between the City of Livermore and Interstate 680, in an unincorporated area of Alameda County. The Project consists of the following elements:
 - a. Improvement of the existing SR 84 by realigning steep and winding portions, installing truck-climbing lanes, and widening to current Federal Highway standards;
 - b. Conversion of portions of the existing SR 84 alignment to frontage road; and,
 - c. Obliteration of portions of the existing SR 84.
- 2. Project construction is expected to occur over a three-year period, beginning in March 2007, and ending in October 2010. Construction will be divided into three phases:
 - a. Construction of the westernmost two-thirds of the new frontage road and temporary detour road;
 - b. Construction of the majority of the realigned Route 84; and,
 - c. Construction of the last one-third of the frontage road, removal of the temporary detour, and smoothing the transitions between the new and existing roadway.
- 3. There are approximately 4.66 acres of jurisdictional waters of the United States, including creeks and wetlands, on the Project site that are waters of the State and delineated waters of the United States. The site's waters are comprised of:
 - a. Approximately 5,318 linear feet (0.61 acres) of freshwater seasonal creeks; and,
 - b. Approximately 4.05 acres freshwater seasonal wetlands.
- 4. The Project will result in the placement of approximately 654,000 cubic yards of cut and fill, with all cut being used on-site, and no import of fill material. 4,130 cubic yards of earth will permanently fill approximately 2.21 acres of jurisdictional waters of the United States, comprised of 1.87 acres of fresh seasonal wetlands and 2,775 linear feet (0.34 acres) of freshwater seasonal creeks, which includes mature oak woodland riparian forest. Project activities will temporarily disturb 0.42 acres of jurisdictional waters of the United States, comprised of 0.35 acres of freshwater seasonal wetlands, and 440 linear feet (0.07 acres) of freshwater seasonal creeks.

- 5. Portions of the waters on the Project site serve as habitat for the federally and state-listed threatened California red-legged frog (*Rana aurora draytonii*, hereinafter CRLF) and California tiger salamander (*Ambystoma californiense*, hereinafter CTS). The Project site also provides habitat for the federally-listed threatened vernal pool fairy shrimp (*Branchinecta lynchi*, hereinafter VPFS).
- 6. Mitigation Plan: To mitigate for permanent and temporary fill of 2.21 and 0.42 acres of wetlands, respectively, a combination of on and off-site mitigation will be implemented, as described in the Department's Draft Revised Water Quality Certification Mitigation and Monitoring Report (hereinafter Draft Report), dated, "Revised Draft 2006," and received by the Water Board on March 13, 2006. The Draft Report does not propose mitigation sufficient to fully address the proposed Project impacts. This Order requires the Department to complete additional mitigation to fully address all impacts. The Draft Report's proposed mitigation consists of the following:
 - a. On-site creation. 0.92 acres of freshwater seasonal wetland and 791 linear feet (0.18 acres) of freshwater seasonal creeks will be created on-site. Existing freshwater seasonal wetlands will be expanded to create 0.43 acres of new wetlands. 0.49 acres of freshwater seasonal wetlands will be created on-site, at locations not historically wetlands, using excavated soil from permanently impacted wetland areas on-site. Approximately 791 feet (0.18 acres) of seasonal creek channel will be created adjacent to the existing tributary to Arroyo del Valle, which is proposed to be permanently impacted by the Project.
 - b. **On-site restoration**. To mitigate for a portion of the Project's 0.42 acres of temporary impacts to habitat, the Department is proposing to restore 0.42 acres of temporarily disturbed areas within the Project site. Temporarily disturbed areas will be restored on an ongoing basis throughout the life of the Project immediately following completion of construction in each section.
 - c. **On-site enhancement.** The Department also proposes to enhance approximately 1,510 linear feet (460 meters) of riparian oak woodland habitat along the ephemeral creek paralleling Highway 84 from Station 72+80 through 77+40, downstream from the relocated creek channel.
 - d. On-site creek relocation. An estimated 535 linear feet of the 2,775 feet of impacted channel are being relocated at the east end of the project from stations 80+35 to 81+05, and 81+50 to 82+40. Caltrans has not proposed taking credit for this channel relocation as mitigation to offset channel loss since a future project may result in impacts to the relocated channel. These relocated channel portions are anticipated to be in place at least until the completion of the Alameda 84 realignment project, in 2010, and at least 5 years prior to any future impacts, thus serving to offset temporal losses on the project.
 - e. **Off-site enhancement and creation**. The Department has proposed wetland creation and riparian enhancement mitigation on privately owned and actively grazed ranchland on the southern side of Patterson Pass Road, immediately east of Cross Rd.

in the city of Livermore (Sweet Property). The site contains hillside seeps and an unnamed tributary to the Arroyo Mocho. Proposed mitigation at the Sweet Property includes creation of 2.5 acres of freshwater seasonal wetlands, enhancement of 5,410 linear feet of degraded creek, preservation of 52 acres of contiguous upland grassland, a grazing management plan, and conservation easements over the mitigation areas.

The mitigation proposed in the Draft Report would not fully mitigate for the proposed creek impacts, in part because the Department has not yet been able to identify or does not yet have fully in place all mitigation locations, mitigation site functions and values, detailed mitigation designs, draft conservation easement agreements, a timeline identifying when mitigation would be completed, and appropriate compensation for permanent impacts to riparian waters. The Department will also be permanently impacting special-status species habitat and a significant length and area of mature oak riparian forest. Additionally, while the proposed mitigation would be in-kind, significant portions would be located off-site. Pursuant to the California Wetlands Conservation Policy and the Basin Plan, the Board shall generally require additional mitigation when the mitigation is implemented off-site. Therefore, this Order requires that jurisdictional wetlands and waters be mitigated by ensuring the successful restoration or creation of, at a minimum, a total of 5.6 acres of freshwater seasonal wetlands, and 11,900 linear feet of enhanced freshwater seasonal creeks, at one or more locations that are simultaneously within Alameda County and within the Alameda Creek Watershed. The remaining required mitigation after implementation of the 1,510 linear feet of proposed on-site creek enhancement and off-site mitigation comprised of creation of 2.5 acres of freshwater seasonal wetlands and enhancement of 5,400 linear feet of creek at the Sweet Property will be 2.1 acres of wetlands creation and 4,980 linear feet of creek enhancement.

The Water Board recognizes that some mitigation sites may also provide opportunities to complete preservation and enhancement of waters and wetlands. The Department may propose a creek and wetland mitigation package that substitutes preservation and enhancement for a portion of the required restoration and creation. Such substitution must be in all cases beyond the overall benefit provided by the wetland and creek restoration and creation required by this Order.

Mitigation will be provided on private lands as identified by the Alameda County Conservation Partnership (ACCP). The ACCP is a joint project of the Alameda County Resource Conservation District and the Natural Resources Conservation Service (NRCS) that has crafted a streamlined permit process and implementation plan for improving and preserving special-status wildlife habitat on private ranch lands. The ACCP has identified approximately 25 deteriorating agricultural stock ponds throughout Alameda County that are in need of immediate repair to prevent complete failure and loss of wildlife habitat. The Department will ensure the restoration and preservation in perpetuity of wetlands and waters on these private lands. Upon restoration, conservation easements will be placed on all mitigation areas.

Restoration work is proposed to commence in the fall of 2006. In the event that mitigation goals at the Sweet Property cannot be provided on or before January 31, 2008, the remaining required mitigation at the Sweet Property, plus an additional one-fifth of that remaining required mitigation, shall be constructed prior to January 31, 2009. For every year of delay thereafter, the required amount of remaining off-site mitigation shall be increased by one-fifth, on an areal basis for seasonal wetlands, and on a linear foot basis for riparian waters. Construction of all off-site mitigation requirements shall be provided on or before January 31, 2010.

7. On-site wetlands and waters will be created and enhanced in the following areas, as the highway runs from the southwest to the northeast (station numbers correspond to the proposed roadway, and are in meters):

a. 0.05 acres of freshwater seasonal wetlands will be created between stations 58+80 and 60+80, where 0.24 of 0.60 acres of an old livestock stock pond are to be permanently filled. A new berm will be installed at the uphill end of the existing

wetland area to allow additional ponding to the east and north.

0.37 acres of shallow, freshwater seasonal wetlands will be created on the northeastern side of the proposed roadway, between stations 62+80 and 63+60. To accommodate the new wetlands, culverts will be removed at the existing location and the site will be graded to promote ponding. The new wetlands will drain into ephemeral tributaries of San Antonio Reservoir.

c. 0.47 acres of 1.22 acres of existing wetlands will be expanded by 0.27 acres at its southern and northern portions, between stations 67+00 and 68+80. The 1.22 acres of wetlands provide breeding habitat for the CTS and VPFS, and has been found to contain CTS larva and VPFS cysts. 0.75-acres of the wetlands will be

permanently impacted by the proposed Project.

d. On-site creation of waters consists of filling and relocating an ephemeral creek channel from its existing location to the toe of a new slope where the slope intersects the bank of the existing creek. The proposed channel will be broken into four segments totaling 791 linear feet (0.18 acres) between stations 69+65 and 72+80. 220 linear feet are proposed to be unvegetated, rock-lined channels, and 571 linear feet are proposed to have a combination of natural and rock-lined bottom. Rock weirs will be placed within the channel at locations to create two freshwater seasonal wetland areas, as mentioned below in e and f. The area of the in-stream created wetlands will not be calculated into the linear feet or acreage totals for created freshwater seasonal creeks, but rather, totaled into the acreage totals for created seasonal freshwater wetlands.

e. 0.07-acres of freshwater seasonal wetlands are planned to be created immediately adjacent to the western side of the proposed roadway, between stations 70+10 and 70+40. The wetlands would lie adjacent to the former location of 0.12 acres of freshwater seasonal wetlands, which is proposed to be permanently impacted by the Project. The wetlands will be created between two in-stream rock weirs.

f. 0.05 acres of freshwater seasonal wetlands are proposed for the western side of the roadway, between stations 71+50 and 71+80. The wetlands will be created

between two in-stream rock weirs.

- g. Enhancement of 1,510 linear feet of existing creek channel from Station 72+80 through 77+40. Enhancement activities include planting approximately 1.01 acres (43,938 square feet) of oak woodland tree and shrub species along the currently grazed stream corridor, in areas currently devoid of vegetation. The creek corridor, varying from approximately 600 feet to 2,000 feet in width between the toe of new slope and the old highway, will also be removed from grazing activities, since it will be fully fenced off within the Caltrans right-of-way.
- h. 0.10 acres of additional freshwater seasonal wetlands will be created on the northern side of the proposed roadway between stations 77+10 and 77+60, by expanding existing wetlands to the west. The created wetlands will receive water via a culvert draining from wetlands at the opposite side of the proposed roadway.
- i. Recreation of approximately 535 linear feet of channel between Stations 80+40 and 82+40.
- 8. To mitigate for a portion of the temporal losses of wetlands and waters resulting from the time delay between commencement of wetland impacts and successful wetland restoration or creation, the Department will initiate the off-site creation, preservation, and restoration of wetlands prior to the onset of wetland habitat impacts. Additionally, the Department will restore wetlands and waters temporarily impacted by Project activities, immediately following that portion of Project construction. The Department will provide the Water Board with impact and restoration activity time schedules throughout the life of the Project. The time schedules will allow the Water Board to determine if temporary impacts are being restored in a timely manner, as proposed in the Final Mitigation Plan, as well as determine the compliance status of off-site mitigation activities as identified in Finding 6.e.
- 9. Vernal Pool Fairy Shrimp: The Department has been given terms and conditions by the USFWS, in the Project's Biological Opinion issued February 28, 2005, and the Amendment to the Biological Opinion, dated April 27, 2005, to ensure the implementation of Reasonable and Prudent Measures to minimize Project impacts to the VPFS. To mitigate for potential impacts to the VPFS, the Department will reserve \$216,300 to be used for in-lieu payments for 2.06-acres of VPFS habitat. The funds shall be released by the Department upon instruction from the USFWS. This Order requires the Department to ensure the purchase of at least 2.06 acres of VPFS habitat on or before October 1, 2010.
- 10. California Tiger Salamander: The proposed Project is within critical habitat proposed for the CTS by the USFWS. The Department has been given terms and conditions by the USFWS, in the Biological Opinion issued February 28, 2005, and the Amendment to the Biological Opinion, dated April 27, 2005, to ensure the implementation of Reasonable and Prudent Measures to minimize Project impacts to the CTS. To compensate for impacts to CTS habitat, the Department is proposing to purchase 80 credit acres for CTS habitat, as well as provide \$650,000 to be reserved in an internal account for future funding to be used to conserve habitat for the San Joaquin Kit Fox and the East Bay Unit of the CTS. The East Bay region generally includes the area from Alameda County south to Santa Benito and Santa Clara counties, and western Merced County. This Order requires the Department to ensure the purchase of 80 credit acres of CTS habitat on or before October 1, 2010.

To minimize impacts to the CTS, the Department will:

- Restrict construction around the CTS pond to a period when the pond is dry and there
 is not CTS breeding activity;
- Prohibit ground disturbance activities between October 31 and March 1 outside the limits of the established road bed; and,
- Work with the California Department of Fish and Game (CDFG) to find and relocate CTS one year prior to Project construction.
- 11. California Red-Legged Frog: The proposed Project is within critical habitat proposed for the CRLF by the USFWS. The Department has been given terms and conditions by the USFWS, in the Project's Biological Opinion issued February 28, 2005, and the Amendment to the Biological Opinion, dated April 27, 2005, to ensure the implementation of Reasonable and Prudent Measures to minimize Project impacts to the CRLF. To mitigate for the potential impacts to the CRLF, the Department has purchased 25 acres of CRLF habitat at the Ohlone Preservation Conservation Bank. A CRLF survey and relocation program will be completed on the Project site prior to the initiation of Project construction.
- 12. Conservation Easement: The Department shall submit a Final Mitigation and Monitoring Report (Final Mitigation Plan) that is acceptable to the Executive Officer, and that modifies the Draft Report. The Final Mitigation Plan will include how the mitigation lands are to be managed and preserved under the conservation easements. The long-term management of the mitigation sites will be provided using CDFG's model Conservation Easement (CE) as a template (see Attachment 1), and the management guidelines of the NRCS, acceptable to the Executive Officer. The CE shall identify the entities responsible for the long-term management of the mitigation sites. The accepted conservation easements shall be recorded not later than January 31, 2011, and within one year of the date of mitigation construction completion on any parcel with mitigation, whichever is earlier.
- 13. Long-term Management: This Order requires the Department to submit, prior to the start of Project construction, Property Analysis Records (PAR), or equivalent analyses estimating the endowment amounts necessary for the appropriate management, in perpetuity, of the mitigation areas. This Order requires these amounts be included as part of the Final Mitigation Plan.
- 14. Post-construction stormwater management: Operation of the reconfigured SR84 will impact beneficial uses through the discharge of stormwater containing automobile-related pollutants (e.g. oil, grease, heavy metals, etc.). To address the Project's post-construction impacts to beneficial uses, the Department proposed to install biofiltration strips along portions of the reconfigured SR 84. The strips would treat pollutants from approximately 12 acres, or 50% of the impervious surfaces within the Project limits.

Post-construction stormwater treatment controls (e.g., biofiltration strips) were not incorporated into the project design during the planning phase, but rather, the placement of treatment controls were evaluated for feasibility within the spatial limits of the final Project design. Consequently, the amount of impervious area that could be treated by stormwater

treatment controls is necessarily limited by the remaining available right-of-way within the Project area. Opportunities for treatment of roadway pollutants are further limited, given that portions of the proposed treatment controls are planned in areas subject to planned future roadway expansion. As such, to provide post-construction stormwater treatment to the maximum extent practicable, as required in State Water Resources Control Board Water Quality Order No. 99-06-DWQ, the NPDES Statewide Permit for Storm Water Discharges From the State of California Department of Transportation Properties, Facilities, and Activities (hereinafter Statewide Permit), the Department may collaborate with the City of Livermore (City) and the Alameda County Zone 7 Flood Control District (Zone 7) to provide for the treatment of dry weather urban runoff from approximately 1536 acres of existing residential and commercial areas discharging to the Arroyo Las Positas, nearby the Springtown Golf Course in the City of Livermore. The treatment would involve capture and filtration of dry-weather urban runoff through the use of a vegetated basin and swale(s). The Department would provide a water quality benefit equivalent to effectively treating 80 - 90% of average annual runoff from the SR84 Project site. Any additional treatment provided above that level of water quality benefit would be applied to future Department projects with stormwater requirements. Should this proposal prove infeasible, then the Department will provide alternate treatment, which may include treatment of stormwater runoff from the reconfigured SR84.

In the event that an arrangement cannot be reached between Zone 7 and the City, the Department shall provide the Water Board with alternate treatment that provides a water quality benefit equivalent to effectively treating 80 - 90% of average annual runoff from the Project.

- 15. **Hydromodification:** Project implementation will result in an increase of 14.2 acres of impervious surface. As a result, in comparison with the pre-Project conditions, stormwater runoff will be discharged from the Project site at greater volumes and over a shorter period of time following storm events. Consequently, operation of the Project will increase the potential for creek bed and bank erosion impacts downstream of the Project site.
 - The Department has submitted hydrologic data and analysis that represents changes in impervious surface and runoff coefficients for each watershed within the Project limits. Based upon an analysis of the data, the Department has concluded that changes in impervious surfaces will not result in significant hydromodification impacts downstream of the Project site. Based on a review of the submitted analyses and their underlying data, additional mitigation to address potential hydromodification impacts is not required in this Order.
- 16. On January 18, 2006, the Department submitted an initial application for Water Quality Certification and Waste Discharge Requirements for the Project. That application was subsequently completed by additional submittals.
- 17. The Water Board has determined to regulate the proposed discharge of fill materials into waters of the State by issuance of Waste Discharge Requirements (WDRs) pursuant to Section 13263 of the California Water Code (CWC) and 23 CCR §3857, in addition to issuing certification pursuant to 23 CCR §3859. The Water Board considers WDRs

necessary to adequately address impacts and mitigation to beneficial uses of waters of the State from this project, to meet the objectives of the California Wetlands Conservation Policy (Executive Order W-59-93), and to accommodate and require appropriate changes over the life of the project and its construction.

- 18. The Water Board, on June 21, 1995, adopted, in accordance with Section 13244 et.seq. of the CWC, a revised Water Quality Control Plan, San Francisco Bay Basin (Basin Plan). This updated and consolidated revised Basin Plan was approved by the State Water Resources Control Board and the Office of Administrative Law on July 20, 1995, and November 13, 1995, respectively. A summary of regulatory provisions is contained in 23 CCR Section 3912. The Basin Plan defines beneficial uses and water quality objectives for waters of the State, including surface waters and groundwaters. This Order is in compliance with the Basin Plan.
- 19. The subject wetlands, seasonal creeks, and other waters on the Project site are located in the South Bay Basin, and are tributaries to either Arroyo Valle, Vallecitos Creek, or San Antonio Reservoir. Vallecitos Creek is a tributary to Arroyo de la Laguna and Alameda Creek. The Basin Plan does not explicitly designate beneficial uses for waters on the Project site. However, the Basin Plan states that "[t]he beneficial uses of any specifically identified waterbody generally apply to all of its tributaries." The following existing beneficial uses defined in the Basin Plan for identified waterbodies are:
 - Agricultural supply (Alameda Creek);
 - Cold freshwater habitat (Alameda Creek, Arroyo Valle, San Antonio Reservoir);
 - Groundwater recharge (Alameda Creek, Arroyo de la Laguna, Arroyo Valle);
 - Fish migration (Alameda Creek, Arroyo de la Laguna);
 - Municipal and domestic water supply (Arroyo Valle, San Antonio Reservoir);
 - Water contact recreation (Alameda Creek, Arroyo de la Laguna,);
 - Non-contact water recreation (Alameda Creek, Arroyo de la Laguna, San Antonio Reservoir);
 - Fish spawning (Alameda Creek, Arroyo de la Laguna, Arroyo Valle, San Antonio Reservoir);
 - Warm freshwater habitat (Alameda Creek, San Antonio Reservoir); and,
 - Wildlife habitat (Alameda Creek, Arroyo de la Laguna, Arroyo Valle, San Antonio Reservoir).

Additionally, waters on the Project site provide habitat for the preservation of protected species, including the federally and state-listed threatened CRLF and CTS. The Project site also provides habitat for the federally-listed threatened VPFS.

20. The Basin Plan Wetland Fill Policy (policy) establishes that there is to be no net loss of wetland acreage and no net loss of wetland value, when the project and any proposed mitigation are evaluated together, and that mitigation for wetland fill projects is to be located in the same area of the Region, whenever possible, as the project. The policy further establishes that wetland disturbance should be avoided whenever possible, and if not possible, should be minimized, and only after avoidance and minimization of impact should mitigation for lost wetlands be considered.

- 21. The goals of the California Wetlands Conservation Policy (Executive Order W-59-93, signed August 23, 1993,) include ensuring "no overall loss" and achieving a "...long-term net gain in the quantity, quality, and permanence of wetland acreage and values..." Senate Concurrent Resolution No. 28 states that "[i]t is the intent of the legislature to preserve, protect, restore, and enhance California's wetlands and the multiple resources which depend upon them for benefit of the people of the State." Section 13142.5 of the CWC requires that the "[h]ighest priority shall be given to improving or eliminating discharges that adversely affect...wetlands, estuaries, and other biologically sensitive areas."
- 22. With the successful implementation of the mitigation measures described in these findings and the provisions, the Water Board finds that the Project will comply with the California Wetlands Conservation Policy and Basin Plan Wetland Fill Policy referenced in Findings 20 and 21.
- 23. This Order applies to the temporary and permanent fill and indirect impacts to waters of the State associated with the Project, which is comprised of the components listed in Finding 1.
- 24. The Department has submitted an Alternatives Analysis to show that appropriate effort was made to avoid and then to minimize wetland disturbance, as required by the Basin Plan. Water Board and federal agency staff held additional discussions with the Department regarding its Alternatives Analysis. The Water Board concurs with the conclusions of the Alternatives Analysis.
- 25. Discharges of stormwater associated with construction activity will occur. The Department is responsible for obtaining appropriate permits for these discharges, including complying with the rules and regulations of National Pollutant Discharge Elimination System (NPDES) permit requirements. This includes complying with the requirements of its Statewide Permit.
- 26. Because of the Project's proximity to sensitive resources, including special status species habitat, and potential to discharge materials that could significantly impact those resources, this Order requires the Department to submit a Storm Water Pollution Prevention Plan (SWPPP) for the Project, prepared pursuant to the provisions of its Statewide Permit, at least 60 days prior to the beginning of construction for the Project.
- 27. Discharges of ground water or other non-storm water during construction may be required. This Order considers such discharges covered by the Statewide Permit, contingent on submittal of an acceptable discharge plan at least 30 days prior to such a discharge.
- 28. The California Environmental Quality Act (CEQA) requires all projects approved by State agencies to be in full compliance with CEQA, and requires a lead agency to prepare an appropriate environmental document (e.g., Environmental Impact Report or Negative Declaration) for such projects. The Water Board has reviewed the Project's environmental documents, and finds that all environmental impacts have been identified for the project activities it is required to approve, and that with compliance with the conditions of this Order, that mitigation measures and/or alternatives have been incorporated to reduce those

impacts to a level of insignificance. On April 19, 2005, the Department issued a Negative Declaration indicating that the Project would not have a significant impact on the environment.

- 29. The Department has applied to the U.S. Army Corps of Engineers (Corps) for an Individual Permit for the Project under Section 404 of the Clean Water Act.
- 30. In February 2005, the United States Fish and Wildlife Service (USFWS) issued a Biological Opinion, and an amendment in April 2005, for the Project (USFWS File No. 1-1-04-F-0115), finding that it is not likely to jeopardize the existence of either the CRLF, CTS, or the VPFS.
- 31. Pursuant to 23 CCR Sections 3857 and 3859, the Board is issuing WDRs and Water Quality Certification for the Project as described herein.
- 32. The Water Board has notified the Corps, Alameda County, the City of Livermore, the City of Pleasanton, USFWS, CDFG, and other interested agencies and persons of its intent to prescribe WDRs and Water Quality Certification for this discharge.
- 33. The Water Board, in a public meeting, heard and considered all comments pertaining to the discharge.
- 34. Project files are maintained at the Water Board under file number 2199.9457 and site number 02-01-C0884.

IT IS HEREBY ORDERED that the Department, in order to meet the provisions contained in Division 7 of the California Water Code (CWC) and regulations adopted thereunder, shall comply with the following, pursuant to authority under CWC Sections 13263 and 13267:

A. Discharge Prohibitions

- 1. The direct discharge of wastes, including rubbish, refuse, bark, sawdust, concrete, asphalt, or other solid wastes into surface waters or at any place where they would contact or where they would be eventually transported to surface waters, including flood plains, is prohibited.
- 2. The discharge of floating oil or other floating materials from any activity in quantities sufficient to cause deleterious bottom deposits, turbidity, or discoloration in surface waters is prohibited.
- 3. The discharge of silt, sand, clay, or other earthen materials from any activity in quantities sufficient to cause deleterious bottom deposits, turbidity, or discoloration in surface waters is prohibited.
- 4. The wetland fill activities subject to these requirements shall not cause a nuisance as defined in CWC § 13050(m).

- 5. The discharge of decant water from active dredging or fill sites and dredged material/wet sediment stockpile or storage areas to surface waters or surface water drainage courses is prohibited, except as conditionally allowed following the submittal of a discharge plan or plans as described in the Provisions.
- 6. The groundwater in the vicinity of the Project shall not be degraded as a result of the Project activities or placement of fill for the Project.
- 7. The discharge of materials other than stormwater, which are not otherwise regulated by a separate NPDES permit or allowed by this Order, to waters of the State is prohibited.
- 8. The discharge of drilling muds to waters of the State, or where such muds could be discharged to waters of the State, is prohibited.

B. Receiving Water Limitations

- 1. The discharges shall not cause the following conditions to exist in waters of the State at any place:
 - a. Floating, suspended, or deposited macroscopic particulate matter or foam in concentrations that cause nuisance or adversely affect beneficial uses;
 - b. Bottom deposits or aquatic growths to the extent that such deposits or growths cause nuisance or adversely affect beneficial uses;
 - c. Alteration of temperature, turbidity, or apparent color beyond present natural background levels;
 - d. Visible, floating, suspended, or deposited oil or other products of petroleum origin; and
 - e. Toxic or other deleterious substances to be present in concentrations or quantities which will cause deleterious effects on wildlife, waterfowl, or other aquatic biota, or which render any of these unfit for human consumption, either at levels created in the receiving waters or as a result of biological concentration.
- 2. The discharges shall not cause nuisance, or adversely affect the beneficial uses of the receiving water.
- 3. The discharges shall not cause the following limits to be exceeded in waters of the State at any one place within one foot of the water surface:
 - a. Dissolved Oxygen: 5.0 mg/L, minimum

The median dissolved oxygen concentration for any three consecutive months shall not be less than 80% of the dissolved oxygen content at saturation. When natural factors cause concentrations less than that specified above, then the discharges shall not cause further reduction in ambient dissolved oxygen concentrations.

c. pH:

The pH shall not be depressed below 6.5 nor raised above 8.5, nor caused to vary from normal ambient pH by more

than 0.5 pH units.

e. Nutrients:

Waters shall not contain biostimulatory substances in concentrations that promote aquatic growths to the extent that such growths cause nuisance or adversely affect beneficial uses.

C. Provisions

- 1. The Department shall comply with all Prohibitions, Receiving Water Limitations, and Provisions of this Order immediately upon adoption of this Order or as provided below.
- 2. The Department shall submit copies of all necessary approvals and/or permits for the Project and mitigation projects from applicable government agencies, including, but not limited to, CDFG, USFWS, and the Corps, for each Project component applicable to that component, prior to the start of construction on that component.

Project Implementation Deadlines

- 3. Not later than 90 days following the adoption of the Order, the Department shall submit a Final Mitigation and Monitoring Plan that is acceptable to the Executive Officer, and that modifies the Draft Report and is consistent with the requirements of this Order, including dates and deadlines, and which provides for mitigation monitoring and maintenance until the regulatory agencies concur that the mitigation has been successfully completed. The Final Mitigation an Monitoring Plan shall not be deemed acceptable until the Department has received written notification of such acceptance from the Executive Officer. Similarly, the Department is responsible for monitoring and maintenance of Project mitigation until it has received a letter from the Executive Officer accepting the mitigation as complete. The Final Mitigation and Monitoring Plan must include a complete mitigation and monitoring plan for both the proposed on-site and off-site creek and seasonal wetland mitigation, including:
 - a. Planting plans and details for all on- and off-site mitigation, such as designs and construction drawings for in-stream structures, pond reconstructions, grading, planting, and irrigation plans, and all other information, as appropriate;
 - b. A minimum 5-year monitoring period for all wetland restoration activities, including creation and enhancement;

- c. A minimum 10-year monitoring period for all riparian restoration activities, including creation and enhancement;
- d. Performance standards and success criteria for mitigation;
- e. Specific locations and descriptions of reference sites to be used for evaluation of on-site and off-site mitigation success criteria;
- f. For the proposed mitigation locations, the proposed final conservation easements that identify, among other things, the entity or entities that will hold those easements after the monitoring period specified in 3.b and 3.c above;
- g. A finalized financial assurance proposal with all appropriate detail on financial assurances being provided to ensure the establishment and success, in perpetuity, of the proposed mitigation, and including appropriately detailed finalized estimates on the amount of the related financial assurances; and,
- h. A plan to ensure the restoration of temporarily disturbed areas on the Project site immediately following completion of construction in each section.

The Final Mitigation and Monitoring Plan may be amended subject to the review and approval of the Executive Officer. Project construction may not commence until the Final Mitigation and Monitoring Plan has been accepted in writing by the Executive Officer.

- 4. Not later than 90 days following the adoption of the Order, the Department shall provide, subject to the approval of the Executive Officer, a work plan identifying a timeline to implement the remaining mitigation requirements of this Order. The work plan should include dates for submission of all appropriate mitigation details.
- 5. The accepted conservation easements shall be recorded not later than January 31, 2011, and within one year of the date of mitigation construction completion on any parcel with mitigation, whichever is earlier.
- To fully mitigate for proposed Project impacts, the Department shall ensure the 6. successful creation and enhancement on-site of 791 and 1,510 linear feet, respectively, of freshwater seasonal creeks, and the creation of 0.92 acres of freshwater seasonal wetlands. Additionally, the Department shall ensure the successful restoration or creation of, at a minimum, 5.6 acres of freshwater seasonal wetlands, and the enhancement of 11,900 linear feet of freshwater seasonal creeks, to be completed no later than January 31, 2008. The 1,510 linear feet of on-site enhancement shall be applied towards the total required creek enhancement. If the Department cannot meet its off-site mitigation requirements on or before January 31, 2008, then additional mitigation requirements and implementation deadlines will apply, as described below in Provision 7. Additionally, the Water Board recognizes that some mitigation sites may also provide opportunities to complete preservation and enhancement of wetlands and waters. The Department may propose a creek and wetland mitigation package, acceptable to the Executive Officer, that substitutes preservation and enhancement for a portion of the required restoration and creation. Such substitution must be in all cases beyond the overall benefit provided by the wetland and creek restoration and creation required by this Order.

- 7. If all required off-site mitigation proposed in the Final Mitigation and Monitoring Plan as occurring in Fall 2006 through Fall 2007 (specifically, the creek enhancement, wetland creation, and related work on the Sweet property adjacent to Patterson Pass Road) is not constructed by January 31, 2008, the Department shall submit, subject to approval by the Executive Officer, a mitigation proposal to provide the balance of the remaining mitigation required on the Sweet property, plus an additional one-fifth of that remaining required mitigation, to be constructed prior to January 31, 2009. For every year of delay thereafter, the required amount of remaining off-site mitigation shall be increased by one-fifth, on an areal basis for seasonal wetlands, and on a linear foot basis for riparian waters.
- 8. Construction of all off-site mitigation shall be completed by January 31, 2010.

 Construction, not including monitoring and establishment, of all on-site mitigation requirements shall be completed within one year of Project construction completion. The Department shall notify the Executive Officer of the completed construction, by letter, not later than one week after construction has been completed.
- 9. Off-site mitigation shall be located within the Arroyo de la Laguna and Upper Alameda Creek sub-watersheds of the Alameda Creek Watershed, on sites that are also within Alameda County and within the boundaries of this Water Board.
- 10. Should the mitigation that the Department implements to satisfy the requirements of this Order result in a level of mitigation beyond what is required in this Order, in terms of quality, or in terms of implementation preceding the impacts they are mitigating for, the level of additional benefit may be applied as mitigation credit, subject to the approval of the Executive Officer, to this, or other Department projects impacting Waters of the State.
- 11. Not later than 90 days following adoption of the Order, the Department shall submit an updated alternate stormwater treatment proposal acceptable to the Executive Officer that includes all appropriate plans, calculations, narrative description of the proposal, design details, and related information. If a complete proposal cannot be submitted as identified above, then the Department shall submit a work plan for submitting all appropriate plans, calculations, narrative description of the proposal, design details, and related information, with deadlines for submittal of detailed plans and the completion of construction for the proposed stormwater controls. This proposal can be submitted as part of the Final Mitigation and Monitoring Plan, and shall include a level of treatment that has equivalent water quality benefit to effectively treating 80 90% of average annual runoff from the Project.
- 12. The Department shall fully implement any alternate stormwater treatment proposal prior to completion of the third stage of Project construction, as identified in Finding 2.
- 13. The Department shall submit annual mitigation monitoring reports acceptable to the Executive Officer no later than January 31 of each year until the mitigation sites have met their performance standards and final success criteria and the Executive Officer has accepted a notice of mitigation completion for each site, but for not less than a period of

five years and no less than a period of two years after any mitigation habitat irrigation systems have been terminated. If the mitigation and monitoring program indicates that establishment of the habitat is not progressing in a manner or rate consistent with the success criteria proposed and approved by the Executive Officer, the annual mitigation monitoring reports shall evaluate the probable cause(s) of any problems and propose appropriate corrective measures.

- 14. Not later than 60 days prior to commencement of each major phase of Project activities, as identified in Finding 2, the Department shall submit a schedule of Project implementation that includes the dates of impact, restoration, and/or creation as well as areas and lengths, of wetlands and waters to be temporarily and permanently impacted, restored, and/or created. The Department shall notify the Water Board immediately upon deviation from the submitted schedule of implementation.
- 15. Following the end of each construction season (April 1 October 31), and no later than December 31, the Department shall provide an updated summary detailing the extent of impacts to wetlands and waters, with dates and waterbodies identified, as well as areas that have been restored during that year.
- 16. Not later than 60 days prior to the beginning of construction of any Project component, the Department shall submit, acceptable to the Executive Officer, a final SWPPP, prepared pursuant to its Statewide Permit, to address the Project's expected construction stage impacts.
- 17. As-built plans for the mitigation sites shall be prepared and submitted to the Water Board within 90 days of the completion of mitigation site construction.
- 18. The portion of the mitigation activities that will be scheduled to be completed prior to January 31, 2008 shall be identified in the Final Mitigation and Monitoring Plan. Identification of these activities shall include site location and detailed design plans, wetland acreage, linear feet of riparian restoration and preservation, and other appropriate details.
- 19. No construction shall occur within 150 feet of any Waters of the State, on any Project component, until off-site pond and riparian restoration mitigation activities identified in the approved Final Mitigation and Monitoring Plan as being planned prior to construction (specifically, the creek enhancement, wetland creation, and related work on the Sweet property adjacent to Patterson Pass Road) are in a stage of active construction.
- 20. The Department shall ensure the purchase of at least 2.06 acres of VPFS habitat, and 80 credit acres of CTS habitat, pending USFWS identification of appropriate habitat, prior to October 1, 2010, at a location or locations subject to the approval of the Executive Officer.

Other Provisions

- 21. Any substantive modifications to the Final Mitigation and Monitoring Plan or other documents referenced in the Provisions must be approved in writing by the Executive Officer, prior to implementation of the modification.
- 22. All Reports pursuant to these Provisions shall be prepared under the supervision of suitable professionals registered in the State of California, if such registration is required or offered in the profession of the subject field.
- 23. The Department shall immediately notify the Board staff by telephone whenever an adverse condition occurs as a result of this discharge. Such a condition includes, but is not limited to, a violation of the conditions of this Order, a significant spill of petroleum products or toxic chemicals, or damage to control facilities that would cause noncompliance. Pursuant to CWC §13267(b), a written notification of the adverse condition shall be submitted to the Water Board within two weeks of occurrence. The written notification shall identify the adverse condition, describe the actions necessary to remedy the condition, and specify a timetable, subject to any modifications by the Water Board staff, for the remedial actions.
- 24. The Department shall at all times fully comply with the engineering plans, specifications, and technical reports submitted with its application for water quality certification and the completed report of waste discharge.
- 25. All discharges of ground water or other non-storm water during construction are covered under the Statewide Permit, contingent on submittal of an acceptable discharge plan at least 30 days prior to such a discharge.
- 26. The Department is considered to have full responsibility for correcting any and all problems that arise in the event of a failure that results in an unauthorized release of waste or wastewater.
- 27. Any hazardous, designated or non-hazardous waste as defined in Title 23, Division 3, Chapter 15 of the California Administrative Code, shall be disposed of in accordance with applicable state and federal regulations.
- 28. The Department shall clean up and abate any wastes that are discharged at any sites in violation of this Order.
- 29. In accordance with CWC §13260, the Discharger shall file with the Water Board a report of any material change or proposed change in the ownership, character, location, or quantity of this waste discharge. Any proposed material change in operation shall be reported to the Executive Officer at least 30 days in advance of the proposed implementation of any change. This shall include, but not be limited to, all significant new soil disturbances, all proposed expansion of development, or any change in drainage characteristics at the Project site. For the purpose of this Order, this includes any

proposed change in the boundaries of the area of wetland/waters of the United States to be filled.

- 30. The following standard conditions apply to this Order:
 - a. Every certification action is subject to modification or revocation upon administrative or judicial review, including review and amendment pursuant to CWC §13330 and 23 CCR §3867.
 - b. Certification is not intended and shall not be construed to apply to any activity involving a hydroelectric facility and requiring a Federal Energy Regulatory Commission (FERC) license or an amendment to a FERC license unless the pertinent certification application was filed pursuant to 23 CCR §3855(b) and that application specifically identified that a FERC license or amendment to a FERC license for a hydroelectric facility was being sought.
 - Certification is conditioned upon total payment of any fee required pursuant to 23 CCR §3833 and owed by the Department.
- 31. An annual fee for Waste Discharge Requirements pursuant to Section 13260 of the California Water Code is required and shall be paid by the Department in a timely manner.
- 32. The Department shall maintain a copy of this Order at the Project site so as to be available at all times to site operating personnel and agencies.
- 33. The Department shall permit the Water Board or its authorized representative at all times, upon presentation of credentials:
 - a. Entry onto Project premises, including all areas on which wetland fill or wetland mitigation is located or in which records are kept.
 - b. Access to copy any records required to be kept under the terms and conditions of this Order.
 - c. Inspection of any treatment equipment, monitoring equipment, or monitoring method required by this Order.
 - d. Sampling of any discharge or surface water covered by this Order.
- 34. This Order does not authorize commission of any act causing injury to the property of another or of the public; does not convey any property rights; does not remove liability under federal, state, or local laws, regulations or rules of other programs and agencies, nor does this Order authorize the discharge of wastes without appropriate permits from

other agencies or organizations.

- 35. The Water Board will consider rescission of this Order upon Project completion and the Executive Officer's acceptance of notices of completion of mitigation for all mitigation, creation, and enhancement projects required or otherwise permitted now or subsequently under this Order.
- I, Bruce H. Wolfe, Executive Officer, do hereby certify that the foregoing is a full, complete, and correct copy of an Order adopted by the California Regional Water Quality Control Board, San Francisco Bay Region, on May 10, 2006.

Bruce H. Wolfe

Executive Office